aico®

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Product Guide

Fire, Smoke, Heat & CO Alarms

When Lives are at Risk, it Pays to Fit the Best!

Ei Professional®

Contents

Aico Introduction	3
Standards and Regulations	4 – 5
Alarm Sensor Types	6
Positioning, Wiring & Interconnection	7
Innovative Design & Quality Features	8 – 9
Specifier Range - New i-fire Multi-Sensor Alarm	10 – 11
Specifier Range -160RC Series	12 – 13
RadioLINK Wireless Communication	14 – 15
Contractor Range - 140 Easi-fit Series	16 – 17
150 Series	18
Security & Social Alarm Systems - Low Voltage Alarms	19
Battery Alarms	19
System Solution Devices	20 – 21
Special Needs Systems	22 – 23
Carbon Monoxide Alarms	24 – 25
Easy Product Reference Guide	26 – 27

Aico Introduction

UK Market Leaders

As Europe's leading manufacturer of smoke alarms with over 30 years experience, Aico currently outsell every comparable product on the market.

We are committed to producing innovative, high quality, high performance and reliable products to meet the needs of the fire safety industry – because lives are at stake.

Meeting & Exceeding Standards

Aico aim to meet and exceed current standards to ensure the highest product quality and reliability.

- *All smoke and heat alarms carry the Kitemark to indicate independent 3rd party testing by the British Standards Institute (BSI)*
- *Products are tested to British (BS) and European (EN) standards*
- *All products are manufactured and distributed under ISO 9001:2000 standards*
- *Every product is extensively tested at numerous points throughout the production process*

Innovation

Aico have always been at the forefront of domestic alarm technology and have a record of industry firsts.

- *The first BSI Kitemarked range*
- *The first rechargeable back-up supply*
- *The first mains powered heat alarm*
- *The first alarms with Hush technology across the range*
- *The first with RadioLINK wireless communication technology*
- *The first with RC Remote Control functionality*
- *The first Multi-Sensor alarm*
- *The first and only Easi-fit design*

Technical Support

At Aico, we believe that the very best in alarm technology should be backed by the very best technical support possible.

- *Comprehensive product information*
- *On site support*
- *Guidance on standards and regulations*
- *CIBSE recognised CPD (Continuing Professional Development) training*
- *Dedicated technical department*
- *Regional support throughout the UK*

Environment

We understand that environmental concerns will play an ever greater part in everyone's lives and as such we are dedicated to environmental concerns.

- *WEEE Compliant*
- *Repic registered*

Customer Service

In addition to our technical support, we are committed to providing the best possible customer support and assistance.

- *Extensive, full range product stockholding*
- *Next day delivery available*
- *Dedicated sales contact for every region*
- *Product available from the majority of Wholesalers throughout the UK*
- *Comprehensive free literature available for Wholesalers, Specifiers, Installers and End-Users*

Product Range

An extensive product range means that there is a product to suit virtually any requirement.

- **Contractor range**
  - *Ei140 Easi-fit Series smoke and heat alarms*
  - *RadioLINK wireless communication*
  - *Ei205ENA and Ei225EN Carbon Monoxide alarms*
- **Specifier range**
  - *Ei2110 Multi-Sensor alarm*
  - *Ei160RC Series Smoke and Heat alarms*
  - *RadioLINK wireless communication*
  - *Ei260 Series Carbon Monoxide alarms*
- **Special needs range**
  - *Alarm for the deaf and hard of hearing*
  - *Low level alarm control switches*
  - *Warden call signalling devices*
- **Special applications range**
  - *Relays to provide switched outputs*
  - *Visual indicating strobes*
  - *Interface modules*
  - *Manual call points*

What does the British Standard BS 5839: Part 6: 2004 Recommend?

This is the definitive Code Of Practice to which Architects, Building Professionals, Enforcing Authorities, Landlords and Installers should refer for recommendations on the design, installation and use of smoke and heat alarms in the majority of domestic dwellings. Landlords in both the public and private sector are considered to have a Duty of Care to fit compliant smoke and heat alarm systems.

System Grades and Categories

Six different grades of fire detection systems are defined and - generally speaking - the greater the fire risk the more sophisticated the system should be. Briefly, the Grades are as follows:

Grade A
- *A full system with control and indicating equipment installed to BS 5839: Part 1*

Grade B
- *Detectors and sounders using simpler specified equipment*

Grade C
- *Detectors and sounders or alarms with central control*

Grade D
- *Mains powered alarms with an integral stand-by power supply*

Grade E
- *Mains powered alarms with no stand-by power supply*

Grade F
- *Battery powered alarms*

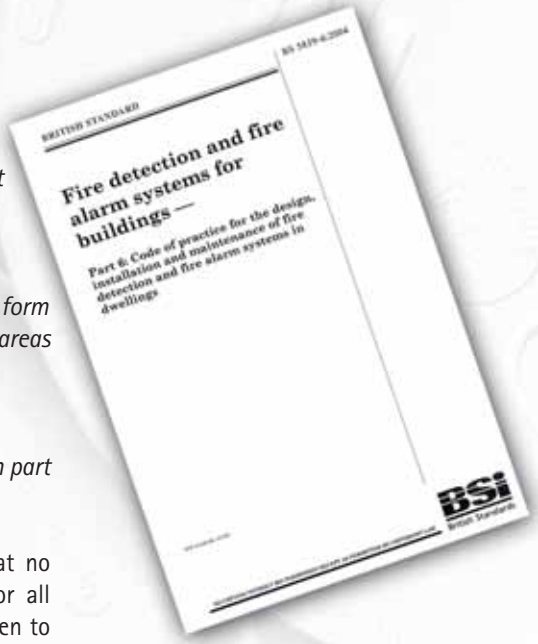
Three different categories of life protection systems are defined. Briefly these are (starting at the highest):

LD1
- *Alarms in all circulation spaces that form part of escape routes and all areas where a fire might start, but not bathrooms, shower rooms or toilets*

LD2
- *Alarms in all circulation spaces that form part of escape routes and rooms or areas that present a high fire risk*

LD3
- *Alarms in circulation spaces that form part of escape routes*

BS 5839: Part 6: 2004 emphasises that no one type of alarm is most suitable for all applications. Consideration must be given to the most suitable type of detection - optical, ionisation and heat (see page 6 for definitions and usage).


BRITISH STANDARD
Fire detection and fire alarm systems for buildings
Part 6: Code of practice for the design, installation and maintenance of fire detection and fire alarm systems in dwellings
BSi

New Build Properties & Materially Altered Dwellings

One to three storeys - Grade D, LD2
- *Mains alarms with battery back-up*
- *Optical smoke alarms in circulation spaces - hallways and landings e.g. Ei146 or Ei166RC with or without RadioLINK*
- *Heat alarm in the kitchen e.g. Ei144 or Ei164RC with or without RadioLINK*
- *Smoke alarm or heat alarm as best suited for the particular circumstance in the main living room*
- *All alarms must be interconnected*
- *The sound pressure level of the alarm signal measured at the doorway of each bedroom with the door open should be at least 85dB(A)*

Existing Tenanted Properties

Two and three storey - Grade D, LD3
- *Mains alarms with battery back-up*
- *Optical alarms in circulation spaces - hallways and landings e.g. Ei146 or Ei166RC with or without RadioLINK*
- *If a fire risk assessment shows the property or occupier to be a high fire risk, increase the number of alarms installed to meet the risk - e.g. follow recommendations for an LD2 installation*
- *All alarms must be interconnected*
- *The sound pressure level of the alarm signal measured at the doorway of each bedroom with the door open should be at least 85dB(A)*

Existing Tenanted Properties

Single storey - Grade F, LD3
- *Battery powered with a minimum battery life of 5 years e.g. Ei 10 year alarm*
- *Optical smoke alarm in circulation spaces - hallway e.g. Ei3105TYCH*
- *If a fire risk assessment identifies a concern that the occupier cannot or may not replace a battery, use mains alarms or mains with battery back-up*
- *If a fire risk assessment shows the property or occupier to be a high fire risk, increase the number of alarms installed to meet the risk - e.g. follow recommendations for an LD2 installation*

What do Building Regulations Demand in New Build & Materially Altered Dwellings?

Architects, builders and installers must comply with Building Regulations and install mains powered alarms in new and materially altered dwellings.

More comprehensive information is provided in our **FREE 'Guide to Residential Fire Detection'**.

England & Wales

Building Regulations Approved Document B (Fire Safety) minimum requirements are currently Grade D, LD3, but it also defines that installation should be to BS 5839 Pt.6 and therefore Grade D, LD2 is recommended.

Grade D, LD3

- *Mains alarms with battery back-up with the mains supply taken from a lighting circuit or a dedicated circuit from the distribution board*
- *Smoke alarms are required in the circulation spaces such as hallways and landings. In general optical alarms are recommended e.g. Ei146, Ei166RC*
- *Heat alarm to be installed in the kitchen where there is no door separating the kitchen from the circulation space, e.g. Ei144, Ei164RC*
- *Smoke and heat alarms must be interconnected*
- *Alarms may be interconnected using radio-links*

Northern Ireland

Building Regulations (Northern Ireland) Technical Booklet E (Fire Safety) requirements were amended in June 2005 to:

Grade D, LD2

- *Mains alarms with a battery back-up*
- *Smoke alarms are required in the circulation spaces, hallways and landings*
- *A smoke alarm is required in the 'principal habitable room' e.g. living room*
- *A heat alarm is required in every kitchen*
- *Loft conversions require all the above to be installed*
- *Smoke and heat alarms must be interconnected*
- *Alarms may be interconnected using radio-links*

Scotland

Building Standards Technical Handbook No 2 (Fire) requirements are currently:

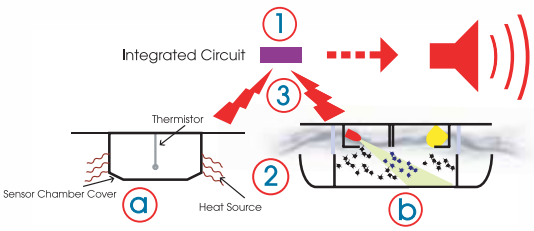
Grade D, LD3

- *Mains smoke alarms with battery back-up*
- *Smoke alarms are required in the circulation spaces, hallways and landings*
- *Smoke alarms must be interconnected*
- *Alarms may be interconnected using radio-links*

Alarm Sensor Types & Positioning,

Alarm Sensor Types

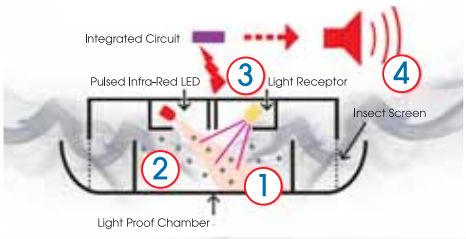
Multi-Sensor Alarms – where should they be used?



The Multi-Sensor combines the best features of an optical alarm – quick response to slow smouldering fires and immunity to kitchen fumes, with the best features of a heat alarm – quick response to a fast flaming fire and immunity from contamination. This makes it the ideal choice for all rooms in a dwelling except a kitchen. The Multi- Sensor is less prone to contamination and effectively eliminates the problems of nuisance alarm associated with the ionisation and the optical type alarms.

1. *A custom algorithm written into the integrated circuit monitors and interprets the signal from...*
   a. *An ultra fast temperature sensor and ...*
   b. *A high performance optical sensor .*
2. *This combination allows detection of both fast flaming and slow smouldering fires.*
3. *This means the alarm will respond quickly to a wider range of fire types than any of the other individual sensor types.*

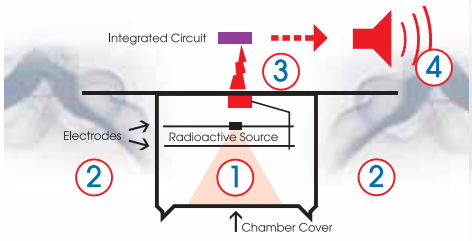
Optical Alarms – where should they be used?



Optical sensors are more responsive to smouldering fires producing large particle smoke typical of fires involving furniture and bedding. They are more immune to invisible smoke produced by 'burning the toast' and similar cooking fumes. This makes them ideal for siting in hallways close to kitchens where false alarms from ionisation alarms may be a particular problem. The BS 5839: Pt.6: 2004 Standard recommends the use of optical alarms in circulation spaces of a dwelling, such as hallways and landings. Optical alarms are prone to false alarm if exposed to steam and should not be located too close to poorly ventilated bathrooms or shower rooms.

1. *A light beam is pulsed in the sensor chamber every 10 seconds to 'look' for smoke. Any smoke present has to be visible to the naked eye so that the receptor can 'see' it. If no smoke is detected, the alarm will remain in a standby state.*
2. *When large particle smoke is detected, the light beam will be scattered onto the light receptor.*
3. *This will then send an electrical signal to the IC (Integrated Circuit).*
4. *This causes the alarm to sound.*

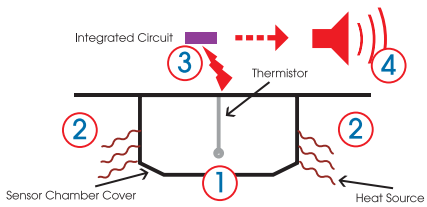
Ionisation Alarms – where should they be used?



Ionisation type sensors are particularly sensitive to the almost invisible smoke produced by fast flaming fires. This makes them more liable to false alarm due to cooking fumes if sited in a hallway close to a kitchen. Ionisation alarms are less vulnerable to false alarms caused by dense tobacco smoke, excessive dust and insect ingress. The BS 5839: Pt.6: 2004 Standard recommends that ionisation alarms should not be used in hallways and landings, where there is a risk of false alarms caused by cooking fumes.

1. *Inside the sensor chamber is a minute (safe) radioactive element that ionises the air within. This causes a small current to flow in the chamber and this will remain constant for the life of the alarm unless smoke particles enter.*
2. *When smoke enters the sensor chamber, the balance of the current is disturbed.*
3. *This is detected by the electronics in the alarm circuitry and a signal is sent to the Integrated Circuit (IC).*
4. *This causes the alarm to sound.*

Heat Alarms – where should they be used?



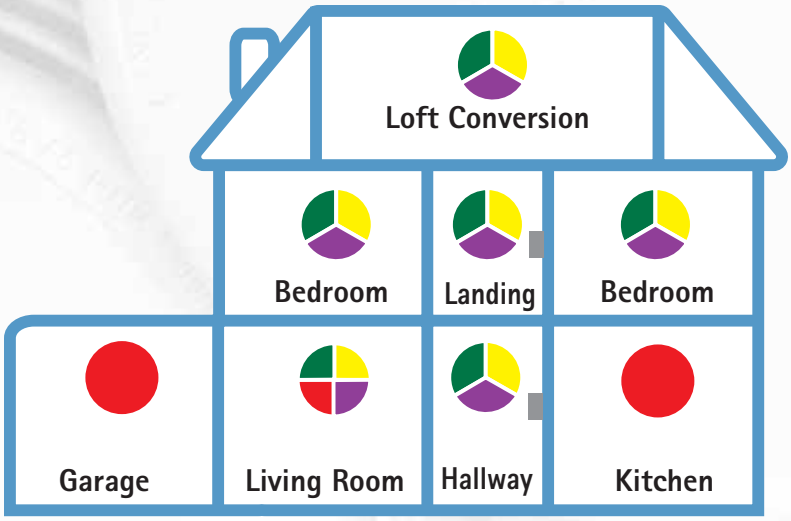
Heat alarms are less likely to cause false alarm problems as they are not responsive to any type of smoke or fumes, only heat. Because of the potential for a slower response than smoke alarms, they should only be used in a fire alarm system that also includes smoke alarms, and all of the alarms must be interconnected. BS 5839: Pt.6: 2004 recommends that heat alarms should be used in kitchens. It goes on to suggest that they may also have a role to play in the main living room but they should not be installed in circulation spaces or areas where fast response to fire is required.

1. *A thermistor (a heat sensitive resistor) is sited in the sensor chamber of the alarm.*
2. *When the temperature rises the resistance of the thermistor reduces.*
3. *The IC continuously monitors the resistance of the thermistor. When this indicates the temperature is 58°C or over, the IC sends a signal to the sounder circuit.*
4. *The alarm then sounds.*

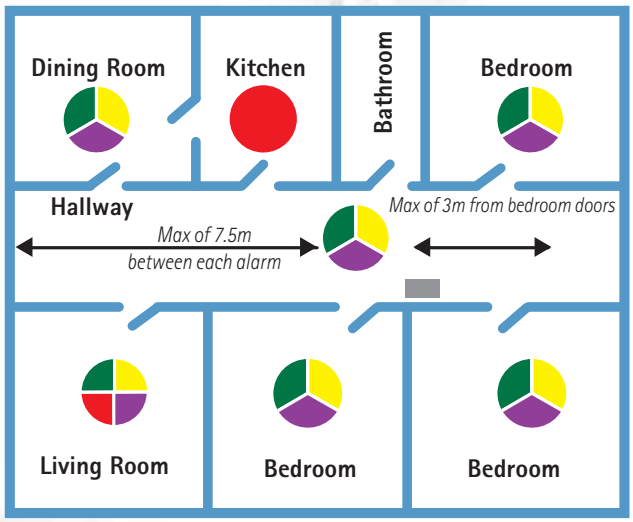
Wiring & Interconnection

Which Alarms to Fit Where?

Two storey dwelling



Single storey dwelling



Multi-Sensor , Optical, Ionisation or Heat as best suited for the particular circumstances

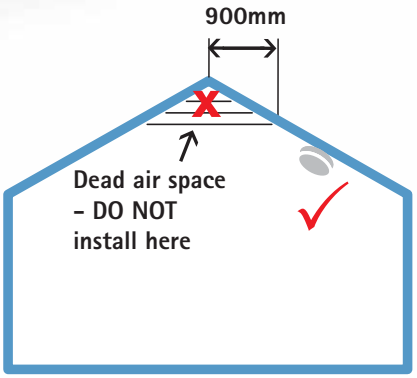
Multi-Sensor, Optical or Ionisation as best suited for the particular circumstances

Do not install smoke, heat or Multi-Sensor alarms in bathrooms, shower rooms or toilets

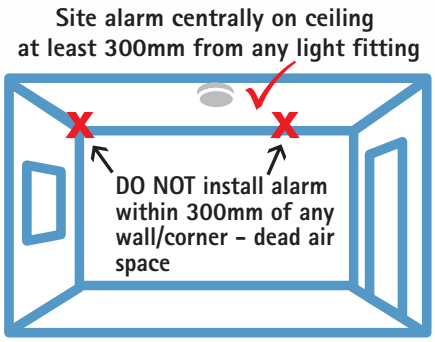
Heat alarm

Alarm control switch (if fitted)

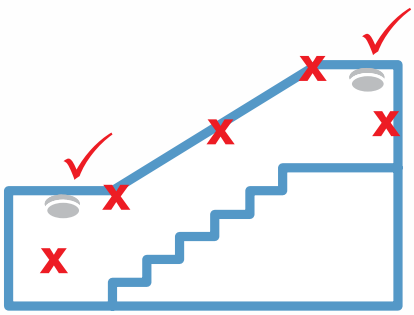
Typical Siting Arrangements



Siting alarm on a sloping roof


Site alarm centrally on ceiling
at least 300mm from any light fitting
DO NOT install alarm
within 300mm of any
wall/corner - dead air
space

Siting alarm in a room



Siting alarms in hallways and on landings

For additional guidance please call the Customer Service Helpline 0870 758 4000

Innovative Design

easi-fit

1 **Screw the mounting plate supplied with the alarm to the ceiling during first fix. No separate enclosure is required.**

2 **Wire up terminals on the mounting plate and clip on the protective cover.**

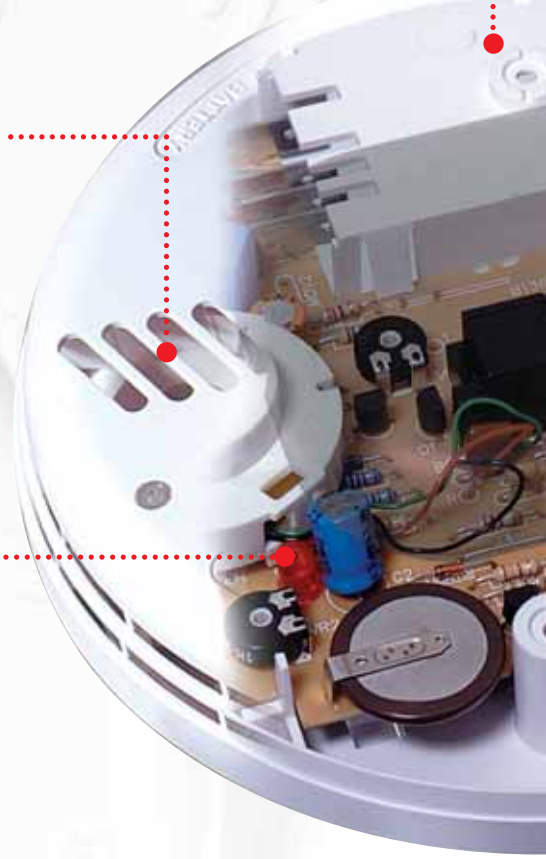
3 **Slide the alarm into place. There's no need to wire up a separate lead and connector.**

Optical Smoke Chamber

Ei's unique large volume optical smoke chamber and sophisticated electronics have a proven track record of reliability and high efficiency detection. Longevity and resistance to false alarms as well as reliable protection from electromagnetic interference has also been proven over many years.

Sounder

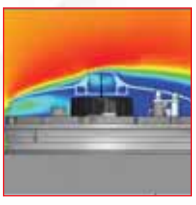
At 85dB(A) at 3 metres our alarms are loud. Unique encased horn assembly has the piezo disc securely held with silicone mastic to prevent creepage and premature horn failure. Additionally soldered contacts prevent failures due to corrosion and arcing associated with more commonly used pressure contacts.



Indicating LEDs

Self monitoring and indicating LEDs and audible warning signals. Each alarm self tests every 40 seconds. Two separate LED indicators are used to indicate healthy mains supply, battery fault, alarm status and low cell/ battery warning.

Heat alarms feature a fixed temperature fast response thermistor sensor, making them ideal for protecting kitchens and garages.

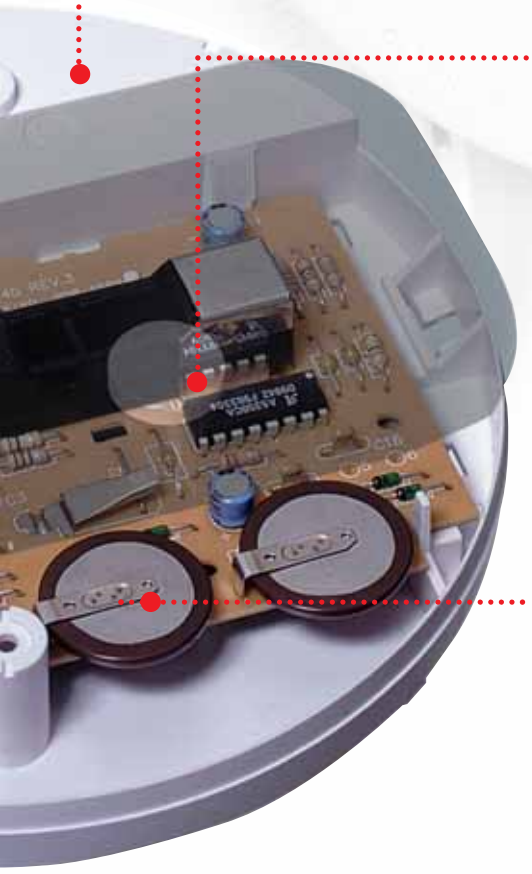


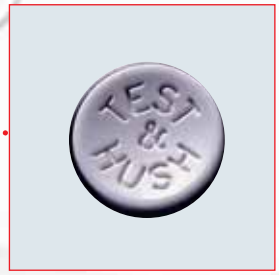
Computer analysis of smoke flow results in a precision casing design that allows fast access of smoke to the sensor.

Quality Features

Insect Screen

Smoke Alarms are sophisticated electronic devices. Protection from external contamination is vital to maintain the fire detecting sensitivity of the product and to minimise false alarms. A fine mesh insect screen reduces false alarms caused by insect contamination and fibres, whilst allowing free access of smoke to the sensor chamber. A dust cover is also provided for protection on site and prior to occupancy.





Test and Hush Button

The test and hush button provides false alarm control on all Easi-fit models. It also provides a manual test function.

Rechargeable Cells

Ultra high performance vanadium pentoxide lithium rechargeable cells are used in the Ei2110 Multi-Sensor, 160RC Series, 150 Series and RadioLINK bases. These cells offer the best back-up possible and are proven to last a minimum of 10 years.

- *A precision charging circuit ensures peak cell efficiency at all times.*
- *Cells provide up to six months back-up without mains power.*

Product Specifications

Ei2110 Multi-Sensor	
Remote Control Compatibility	✔
Mains Powered	✔
Rechargeable Lithium Back-up	✔
Interconnectable	✔
Easi-fit	✔
BS Kitemarked	✔

160RC Series	
Remote Control Compatibility	✔
Optical Sensor	✔
Ionisation Sensor	✔
Heat Sensor	✔
Mains Powered	✔
Rechargeable Lithium Back-up	✔
Interconnectable	✔
Easi-fit	✔
BS Kitemarked	✔

140 Series	
Remote Control Compatibility	
Optical Sensor	✔
Ionisation Sensor	✔
Heat Sensor	✔
Mains Powered	✔
Rechargeable Lithium Back-up	
Alkaline Back-up	✔
Interconnectable	✔
Easi-fit	✔
BS Kitemarked	✔

Ionisation alarms feature a high performance ionisation chamber that responds quickly to flaming fires. Proven in millions of applications.

The Ei2110 Multi-Sensor and 160RC Series alarms allow Test, Hush and Fire Locate functions to be performed from an optional control switch mounted at an easily accessible height.

Alkaline battery back-up in the 140 Series designed to last up to 4 years in stand-by.

Specifier Range i-fire Multi-Sen

NEW

Multi-Sensor Alarm Ei2110

The new Ei2110 Multi-Sensor Alarm offers the specifier and installer an unbeatable combination of enhanced detection coupled with reduced false alarms. The unit contains two separate sensing elements – Optical and Heat – as a well as a host of advanced safety features

features and benefits

- Improved response to all fire types
- Reduced possibility of false alarm
- Multiple sensor elements – optical and heat
- Unique dust compensation
- Comprehensive indicating LEDs
- Remote Control functionality
- Tamper-proof rechargeable Lithium battery back-up
- Low power cell warning
- Built-in Test/Hush button
- easi-fit mounting base
- Interconnectable to other Ei mains powered alarms
- Compatible with Ei168RC RadioLINK base
- 5 year guarantee

Simplified – & Improved – Coverage

Due to the fact that it responds to a large number of fire types, the Ei2110 Multi-Sensor can simplify the alarm type and siting choice when installing a system. Due to their different fire response characteristics, optical and ionisation alarms are suited to different locations within the property. The Multi-Sensor unit would be suited to all locations where an ionisation alarm or optical alarm would be installed - hallway, landing, living room, bedroom - thus simplifying the installation. (A heat alarm would still be the correct choice for kitchens and garages).

More Comprehensive Detection Capability

As the Ei2110 Multi-Sensor contains both Optical and Heat sensing elements, it is able to provide the fastest possible response to the widest range of fire types. Whether a fire is slow and smouldering, or fast and flaming, the unit is designed to provide the earliest detection and therefore warning.

It is especially suitable for areas where a mixed risk is determined during a risk assessment of a property, and where one alarm type would not adequately cover the risks.

Reduced False Alarms

Even the best smoke alarms can be vulnerable to false alarms if they are not regularly cleaned or are sited in an unsuitable area. While obviously the best solution is to regularly clean the alarms or find an alternative siting position, sometimes this just isn't possible.

Because it detects two different elements of fire, the Ei2110 Multi-Sensor is less prone to many of the most common causes of false alarms – such as contamination – and is therefore ideal for use in more 'difficult' applications. It can be sited in an area where problems are anticipated or used as a substitute for an ordinary alarm which is giving problems due to its position.

Unique 'Dust Compensation'

The Ei2110 Multi-Sensor includes a totally unique 'Dust Compensation' feature that automatically adjusts for any contamination within the sensor. This significantly reduces the risk of false alarms whilst retaining the correct level of sensitivity to a real fire condition.

RadioLINK compatible
see pages 14-15

10 Year Plus Lithium Back-up Technology

The Ei2110 Multi-Sensor runs on 230V AC mains power and has built in tamper-proof rechargeable Lithium cells that act as a battery back-up in the event of mains failure. These rechargeable Lithium cells are proven to have a minimum ten-year life and outlast the life of the alarm itself. They provide up to six months alarm operation without mains power.

Hard-Wired or RadioLINK Interconnection

Up to twelve Ei mains powered alarms can be interconnected on a system using hard wiring. This will cause all alarms to sound when one alarm senses fire. Alternatively, the alarms can be mounted on Ei168RC RadioLINK bases to allow them to interconnect via radio frequency signals removing the need to run difficult interconnect wiring. See pages 14-15.

Easi-Fit Design – Save Time and Money

The Ei2110 Multi-Sensor offers all the time and money saving benefits associated with the patented Easi-fit design technology. The unit is supplied with an Easi-fit base that allows very quick and simple installation of the alarm, with all connection terminals built-in and clearly marked. The Easi-fit base automatically connects both mains power and battery as the alarm head slides on.

Full Remote Control Functionality

The Ei2110 Multi-Sensor also has Remote Control functionality - allowing the alarm to be controlled remotely from a Remote Control Switch. This allows Alarm Test, Locate and Hush functions to be performed from a convenient wall mounted switch. If the Ei2110 Multi-Sensor is interconnected to Ei 'RC' mains powered alarms, the whole system can be controlled remotely.

Fire Performance Chart

Test	Rating
Test Fire (TF1) Flaming Wood BS ISO 7240-15:2004	****
Test Fire (TF2) Smouldering Wood BS EN 14604:2005	****
Test Fire (TF3) Glowing Smouldering Cotton BS EN 14604:2005	****
Test Fire (TF4) Flaming Plastic (Polyurethane) BS EN 14604:2005	****
Test Fire (TF5) Flaming Liquid (Heptane) BS EN 14604:2005	*****
Test Fire (TF6) Flaming Liquid (Methylated spirits) BS ISO 7240-15:2004	*****
Test Fire (TF8) Low Temp. Black Smoke (Decalin/Diesel) BS ISO 7240-15:2004	****

Specifier Range 160RC Series For

Mains Powered Alarms with 10 Year+ Rechargeable Lithium Cell Back-up

The 160RC Series Easi-fit mains powered smoke and heat alarms are our highest specification range, especially so when coupled to the RadioLINK system (pages 14-15). Designed for the specifier, installer and end user demanding the very highest standards of safety, performance and reliability you'd expect from Europe's leading manufacturer of mains powered fire detection products.

Almost all practical duty of care provisions are catered for. With no risk of casual back-up cell removal, the power supply is virtually guaranteed against any external threat to the energy supply. Risks of false alarms are minimised and installation costs are lower due to ease of installation and the all round quality of the outstanding 160RC Series.

features and benefits

- Tamper-proof rechargeable Lithium battery back-up
- Low power cell warning
- Built-in Test/Hush button on all models
- easi-fit mounting base
- Interconnectable to other Ei mains powered alarms
- Compatible with Ei168RC RadioLINK base
- Comprehensive Indicating LEDs
- Remote Control functionality
- 5 year guarantee

Why rechargeable Vanadium Pentoxide Lithium Cells?

The 10 year+ technology used in the 160RC Series provides the most effective and reliable back-up power available. Maintenance requirements are negligible. The cells used are the only rechargeable cells with a realistic ten year life expectancy confirmed by manufacturer Panasonic. Constantly 'topped up' by the mains, they out-perform lithium primary batteries, capacitors or rechargeable cells currently in use in other smoke alarms.

- *Environmentally friendly - no special disposal requirements*
- *A precision charging circuit ensures peak efficiency at all times*
- *6 month back-up without mains power*
- *Cells supplied fully charged*
- *Proven 10 year+ life*
- *Cells are soldered for reliable long term connection*
- *Terminals are laser welded for reliability*
- *No battery replacement requirement*

RadioLINK compatible
see pages 14-15

Ei161RC Ionisation Alarm

- *Responds quickly to fast flaming fires*
- *Unique and proven long life ionisation smoke chamber*
- *Kitemarked to BS EN 14604: 2005*
- *Hush button for false alarm control*

Ei164RC Heat Alarm

- *Ideal for protecting kitchens and garages and other areas prone to false alarms*
- *Fixed temperature fast response thermistor sensor, 58° ± 4°C*
- *Kitemarked to BS 5446: Pt.2: 2003 Class A1*
- *Hush button for false alarm control*

Ei166RC Optical Alarm

- *More responsive to slow smouldering fires*
- *Large volume high performance optical chamber with proven extended life capability*
- *Fine mesh insect resistant screen*
- *Kitemarked to BS EN 14604: 2005*
- *Hush button for false alarm control*

Control Switch Ei1529RC

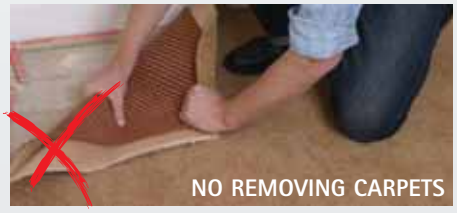
When used in conjunction with RC alarms, this switch offers three vital remote control functions.

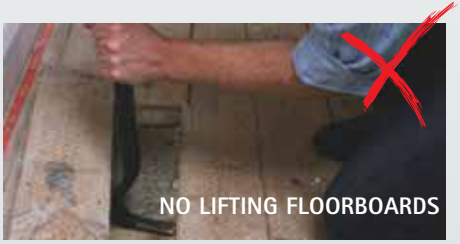
TEST Test all alarms from one convenient switch
HUSH Any nuisance alarm can be quickly and easily silenced
LOCATE Allows the source of the alarm to be identified
MAINS CHECK The Test function will not operate without mains power, providing a simple way to test the mains supply

Manual Call Point MCP401RC

Manual Call Point Surface Mount for use with all Ei mains powered alarms

features and benefits





- Best Practice for single family dwellings, apartments and HMOs
- Easi-fit technology saves time and money on every installation
- Fixed cost interconnection
- Wire-free interconnection and zoning capability
- Fully upgradeable system - future proof
- Reliable interconnection
- Minimises risk of accidental mis-wiring
- No false alarms from normal electrical transients
- Range of optional system control devices
- RadioLINK uses tried, tested and proven radio transceiver technology
- Use with Ei2110 Multi-Sensor, Ei160RC Series and Ei140 Series alarms

The Complete Solution to BS 5839: Pt.6: 2004

RadioLINK

Interconnecting mains powered smoke alarms is essential to provide the earliest possible warning of a fire. Fire statistics show that the quicker occupants are alerted to a fire, the less risk of death or injury there is. Furthermore, property damage is also reduced.

With RadioLINK, mains powered smoke, heat and fire alarms are interconnected by wireless signals rather than cabling. It's so much simpler, more convenient and easier to change or extend as and when required.

Save Both Time & Money

Because there's no need to run interconnect wiring - and to make good the mess caused in the process – you can complete the installation in a fraction of the time which means major time savings for the contractor and significant cost savings for the specifier.

Minimum Disruptions

With RadioLINK there's no need to hard wire interconnect so installing trunking, running cables under floor boards and carpets or even channelling out walls and redecorating is unnecessary thus ensuring houseowners and tenants suffer the minimum of disruption during installation.

Planning for the Future

With RadioLINK's wireless technology, it's exceptionally fast, simple and cost effective to change or add alarms or accessories when the system needs to be reconfigured! As standards change, a RadioLINK system can be adapted easily to meet the new requirements.

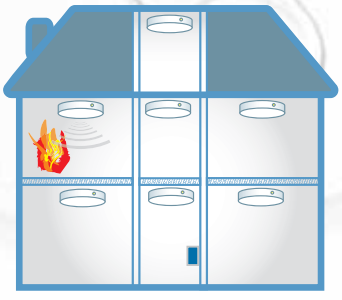
What's more – it's far quicker to install than a hard-wired interconnect system, saving time and money on every installation without compromising safety. Tenant compliance is increased too – because installing a RadioLINK system is far less intrusive, stressful and destructive to décor.

Installing the Most Appropriate System

RadioLINK offers you a choice of Optical, Ionisation, Heat and Multi-Sensor alarms, plus special remote control functions, relay signalling and even special needs equipment such as Deaf Alarms. With up to 12 alarms on one system you can build the right system for the job.

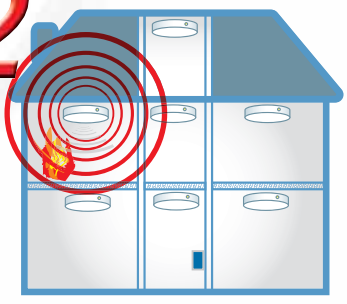
System Operation

1



A fire starts in one of the rooms. It is detected by the Alarm. The Alarm sounds.

2



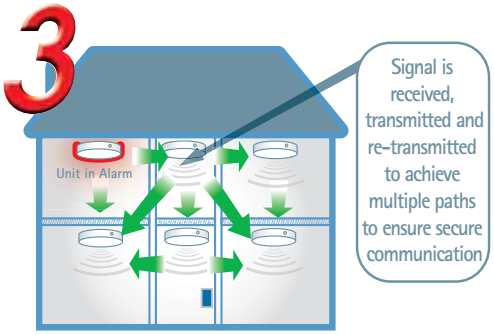
The RadioLINK base sends out a radio-frequency signal to set all the other units into alarm.

Wireless Remote Control Switch Ei411H

(not for use with Ei140 Series)

When used in conjunction with Ei2110 Multi-Sensor or Ei160RC Series alarms, with the Ei168RC RadioLINK base, the switch offers four vital remote control functions.

- *TEST - Provides a full system test equivalent to pressing the Test button on all units simultaneously*
- *HUSH - Allows the silencing of any possible nuisance alarms*
- *LOCATE - Allows the source of the alarm to be identified*
- *MEMORY LOCATE - Allows the previous source of the alarm to be identified when all the alarms have stopped sounding*


3
Unit in Alarm
Signal is received, transmitted and re-transmitted to achieve multiple paths to ensure secure communication

All other alarms sound giving warning of the fire throughout the property.

The Ei168RC RadioLINK Base Unit

At the heart of the RadioLINK system are the Ei168RC base units, which are fully compatible with Ei2110 Multi-Sensor and Ei160RC Series alarms. It is from these bases that radio signals are transmitted and received. **An Ei168RC base is required for each of the alarms in the system.**

- *Mains powered with rechargeable 10 year+ lithium cell back-up*
- *Radio transceiver - 868 MHz Band*
- *Unique Easi-fit design with integral terminal block*
- *Simple and secure House Coding system*
- *Interference free*

The new Ei168RC RadioLINK base now has multiple repeater functionality as standard. This means it can now receive, transmit and re-transmit to achieve multiple signal paths. This multiple path capability allows the system to manage many RF impenetrable structures in the property, which may have previously blocked signals and also gives a more robust system.

Coding and commissioning has also been simplified and is now a faster operation.

Both these upgrades make RadioLINK even better suited to more comprehensive alarm systems - offering greater coverage and protection.

- *RadioLINK Ei168RC Base mounted under all alarms in the system*
- *Remote Control Ei411H - See functions above*

Additional System Devices

Ei407
Manual Call Point

- *Completely wire-free*
- *Powered by built-in 10 year lithium cells*
- *For use with Ei2110 Multi-Sensor, Ei160RC or Ei140 Series alarms on Ei168RC bases*
- *Non-breakable operating element with reset key*

Ei408
Switched Input Module

- *Triggers RadioLINK devices from a set of closing Volt-free contacts (e.g. sprinkler flow switch)*
- *Designed to be remotely sited*
- *Powered by built-in 10 year lithium cells*

Ei420
Repeater and CO Alarm Interface

- *Repeats RadioLINK signals to strengthen signal paths*
- *Allows Ei260RC Series Carbon Monoxide (CO) alarms to be linked into a RadioLINK system*
- *Mains powered with 10 year+ rechargeable lithium cell back-up*

Ei428
Remote Relay Module

- *Contains set of relay contacts that are switched on receipt of a RadioLINK signal*
- *Volt-free relay contacts, rated at 240V 5A*
- *Mains powered with 10 year+ rechargeable lithium cell back-up*
- *Pulse or Constant switching option*

Contractor Range 140 Series For

easi-fit

Mains Powered Alarms with Alkaline Battery Back-Up

1 Screw the mounting plate supplied with the alarm to the ceiling during first fix. No separate enclosure is required.

2 Wire up terminals on the mounting plate and clip on the protective cover.

3 Slide the alarm into place. There's no need to wire up a separate lead and connector.

Designed for applications where the budget is a key consideration and where maintenance is in the hands of the owner occupier or there is no requirement for lithium power cell back-up. The 140 Series provides an alkaline battery back-up instead of rechargeable cells.

Further cost savings are possible through the innovative and totally unique Easi-fit technology, as there is no need to purchase additional wiring enclosures, mounting kits, leads or connectors.

In a field where time is money, the fact that Easi-fit alarms are simpler and quicker to install ensures even greater savings. Now with Easi-fit fixing pack, suitable for use on plasterboard, concrete or wood surfaces.

features and benefits

- The only easi-fit installation system – saves time and trouble on-site
- No additional base to buy and fit – saves time, cost and trouble
- Removable trunking door on mounting plate – simple to fit trunking if required
- No plug and socket to fiddle with to slow the job down
- Quality alkaline battery already fitted – slide alarm on to base to connect it
- Useful fixing screws supplied – suitable for plaster, wood and concrete surfaces
- Alkaline battery designed to last up to 4 years in stand-by
- Multiple cable entries and surface wiring knockouts
- Large, clearly marked wiring connections
- The test/hush button provides false alarm control and also allows the alarm to be manually tested
- Ei's unique large volume optical smoke chamber and sophisticated electronics have a proven track record of reliability and high efficiency detection

RadioLINK compatible
see pages 14–15

Ei141 Ionisation Alarm

- *Responds quickly to fast flaming fires*
- *Unique and proven long life ionisation smoke chamber*
- *Alkaline battery supplied already connected to reduce installation errors (does not draw power until alarm is fitted to the mounting plate)*
- *Hush button for false alarm control*
- *Interconnects with other Ei mains powered smoke and heat alarms*
- *Separate mains and warning LEDs*
- *Time and money saving Easi-fit design*
- *5 year guarantee*
- *Kitemarked to BS EN 14604: 2005*

Ei144 Heat Alarm

- *Ideal for protecting kitchens and garages*
- *Fixed temperature fast response thermistor sensor, 58° ± 4°C*
- *Alkaline battery supplied already connected to reduce installation errors (does not draw power until alarm is fitted to the mounting plate)*
- *Hush button for false alarm control*
- *Interconnects with other Ei mains powered smoke and heat alarms*
- *Separate mains and warning LEDs*
- *Time and money saving Easi-fit design*
- *5 year guarantee*
- *Kitemarked to BS 5446: Pt.2: 2003 Class A1*

Ei146 Optical Alarm

- *More responsive to slow smouldering fires*
- *Advanced optical chamber with proven extended life capability*
- *Fine mesh insect screen*
- *Alkaline battery supplied already connected to reduce installation errors (does not draw power until alarm is fitted to the mounting plate)*
- *Hush button for false alarm control*
- *Interconnects with other Ei mains powered smoke and heat alarms*
- *Separate mains and warning LEDs*
- *Time and money saving Easi-fit design*
- *5 year guarantee*
- *Kitemarked to BS EN 14604: 2005*

Mains Powered Alarms with 10 Year+ Lithium Cell Back-up

Advanced detection technology coupled with superior 10 year+ rechargeable lithium cell back-up made the 150 Series a market leader and the previous first choice for specifiers nationwide.

The 150 Series' popularity and reliability over the last 15 years is proven by the fact that several million units have now been specified and installed by Councils and Housing Associations and are currently protecting households throughout the UK and other countries. Many of these alarms may now be entering the end of their useful life cycle and should be considered for replacement. New 150 Series product will fit the majority of existing installed bases and can therefore offer the most economical replacement programmes.

Ei151TL Ionisation Alarm

- *Responds quickly to fast flaming fires*
- *Unique and proven long life Ei ionisation smoke chamber*
- *Easy to use Test and Hush buttons*
- *Separate mains and warning LEDs*
- *Interconnects with other Ei mains powered smoke and heat alarms*
- *Proven 10 year+ rechargeable lithium cell back-up*
- *Low power cell warning in the event of mains or cell failure*
- *5 year guarantee*
- *Kitemarked to BS EN 14604: 2005*

Ei154TL Heat Alarm

- *Ideal for protecting kitchens and garages and other areas subject to false alarms*
- *Fixed temperature fast response thermistor sensor, 58° ± 4°C*
- *Easy to use Test button*
- *Separate mains and warning LEDs*
- *Interconnects with other Ei mains powered smoke and heat alarms*
- *Proven 10 year+ rechargeable lithium cell back-up*
- *Low power cell warning in the event of mains or cell failure*
- *5 year guarantee*
- *Kitemarked to BS 5446: Pt.2: 2003 Class A2*

Ei156TLH Optical Alarm

- *More responsive to slow smouldering fires*
- *Features the large, advanced Ei optical chamber with proven extended life capability*
- *Fine mesh insect screen*
- *Integral Test and Hush button*
- *Separate mains and warning LEDs*
- *Interconnects with other Ei mains powered smoke and heat alarms*
- *Proven 10 year+ rechargeable lithium cell back-up*
- *Low power cell warning in the event of mains or cell failure*
- *5 year guarantee*
- *Kitemarked to BS EN 14604: 2005*

Security & Social Alarm Systems

Low Voltage Smoke and Heat Alarms

The Ei180 Series

In properties where there is a requirement to connect smoke and heat alarms to a low voltage security system, or Warden Call System, the Ei180 Series alarms can provide the ideal solution.

- *Ionisation, Optical and Heat sensor types available*
- *Integral Test and Hush button*
- *Unique Easi-fit installation - saves time and money*
- *Operates on a wide range of voltages 10VDC - 30VDC*
- *Alkaline battery back-up*
- *Integral relay offering selectable continuous or pulse operation*
- *Smoke alarms Kitemarked to BS EN 14604: 2005*
- *Heat alarms Kitemarked to BS 5446: Pt.2: 2003 Class A2*

The Ei100R Series

In applications where budget is the key, the Ei100R Series of 12VDC smoke and heat alarms available from Aico are ideal for connection to domestic security systems.

- *Ionisation, Optical and Heat sensor types available*
- *Integral relay*
- *Interconnect feature*
- *Smoke alarms Kitemarked to BS EN 14604: 2005*
- *Heat alarms Kitemarked to BS 5446: Pt.2: 2003 Class A2*

Battery Alarms

For applications where the budget will not permit the installation of mains powered smoke alarms or there is a need to quickly provide safe and reliable protection to a large number of properties, the best solution is to specify Ei smoke alarms powered by 10 year + lithium battery cells.

These innovative alarms overcome many of the problems associated with conventional battery-powered units. The lithium battery cells will never need to be replaced during the lifetime of the alarm, thus reducing maintenance requirements or the need to rely on tenants to replace the battery. The lithium battery cells are built into the unit and soldered onto the printed circuit board. Furthermore, they are not compatible with other household appliances, so there is no motivation to remove them.

The range includes both the Ei100TYC ionisation smoke alarm and the Ei3105TYCH optical smoke alarm. The ionisation model features a high quality dual ionisation chamber with corrosion-resistant electrodes and insect resistant cover. The optical model employs a quality optical (photoelectric) sensor with large volume chamber and large high sensitivity photodiode, as well as a fine insect-resistant screen.

Both units offer Test and Hush button facilities with automatic reset, automatic self-test, power on indicator, low battery warning and built-in sounder giving a minimum sound output of 85dB(A) at 3m. Up to 12 units may be interconnected. Kitemarked and backed by a full five year manufacturer's guarantee, Ei smoke alarms with 10 year + Lithium Battery Cell Technology offer proven performance and exceptional reliability at a very affordable price.

- *Built-in 10 year+ lithium battery cell designed to exceed the life of the alarm*
- *Tamper-resistant construction*
- *High quality detection*
- *Technology proven in millions of applications*
- *Greatly reduced maintenance requirements*
- *Test and hush features*
- *Comprehensive indicator lights*
- *Automatic self-test*
- *Up to 12 units can be interconnected*

System Solution Devices

A Cost Effective, Powerful and Highly Flexible System

Aico's truly comprehensive and innovative product range offers specifiers the ability to build a cost effective, powerful and highly flexible larger system where additional control and warning devices are required. With a choice of either RadioLINK wireless interconnect (see pages 14 and 15) or traditional hardwired technology, and unique Remote Control functionality (see page 13), it's possible to custom design and build the optimum system.

There are many options open to the specifier and installer. In properties where a simple system is required, this can be achieved using either RadioLINK RF or hardwired technology.

Where there is a need for a more comprehensive system, just choose the particular control and/or signalling devices that you need and install the system that meets your requirements. If you need advice on a specific application, please contact our Customer Services Department on **0870 758 4000.**

Hard-Wired System Devices

MCP401RC Manual Call Point

- *Mains powered with built-in 10 year+ rechargeable lithium cell back-up*
- *Non-breakable operating element with reset key*
- *For use with Ei2110 Multi-Sensor, Ei160RC and Ei140 Series alarms*

Ei1529RC Remote Control Switch

- *Allows the user to locate the source of an alarm when all units are sounding, hush any false alarms and also test the system*
- *Mains powered*
- *For use with Ei2110 Multi-Sensor, Ei160RC Series and Ei260RC Series alarms*

Ei159 Alarm Locator Switch

- *Allows the user to locate the source of an alarm when all units are sounding*
- *Pressing the locate switch silences all alarms apart from the one that is the source of the alarm*
- *Automatically resets after 10 minutes*
- *For use with Ei2110 Multi-Sensor, Ei160RC, Ei140 and Ei260RC Series alarms*

Ei128R Relay Base

- *Contains set of relay contacts that are switched on receipt of an alarm interconnect signal*
- *Volt-free relay contacts, rated at 240V 5A*
- *Pulse or Constant switching option*
- *Mains powered*
- *For use with Ei2110 Multi-Sensor, Ei160RC and Ei140 Series alarms*

Ei128RBU Relay Base

- *As Ei128R but with built-in 10 year+ rechargeable lithium cell back-up*
- *For use with Ei2110 Multi-Sensor, Ei160RC and Ei140 Series alarms*

Ei128COV Cover

- *Available separately for Ei128R and Ei128RBU*

Ancillary System Devices

SAB300 Xenon Beacon/Strobe

- *For switching via an Ei428 /128R/128RBU relay*
- *Flash energy of 3 Watts and flash frequency of 0.9Hz*
- *For internal or external use (IP65)*
- *Clear(C) or Red(R) lens options*

SABV4 High Intensity Xenon Beacon/Strobe

- *For switching via an Ei428 /128R/128RBU relay*
- *5 Joule high intensity flash*
- *For internal or external use (IP65)*
- *Opal(O) or Red(R) lens options*

Ei167RC Remote Sounder

- *Interconnects with Ei2110 Multi-Sensor, Ei160RC and Ei140 Series alarms*
- *Also compatible with Ei168RC RadioLINK base*
- *Mains powered with 10 year+ rechargeable lithium cell back-up*
- *Minimum sound output of 85dB(A) at 3m*

Y03 Remote Sounder

- *For switching via an Ei428 /128R/128RBU relay*
- *Switchable sound output frequency 500-2900Hz*
- *Sound output level 97-100dB(A)*
- *For internal or external use (IP54)*

MDH230 Magnetic Door Holder

- *For switching via an Ei428/ Ei128R/ Ei128RBU relay*
- *Supplied with metal door plate*
- *Magnet de-activates when relay switches and releases door plate*

RadioLINK System Devices

Ei168RC Base

- *Wireless (radio-frequency) communication*
- *For use with Ei2110 Multi-Sensor, Ei160RC and Ei140 Series alarms*
- *Mains powered with 10 year+ rechargeable lithium cell back-up*
- *Unique 'House Coding' feature prevents interference from neighbouring systems*

Ei407 Manual Call Point

- *Completely wire-free*
- *Powered by built-in 10 year lithium cells*
- *For use with Ei2110 Multi-Sensor, Ei160RC and Ei140 Series alarms on Ei168RC bases*
- *Non-breakable operating element with reset key*

Ei408 Switched Input Module

- *Triggers RadioLINK devices from a set of Volt-free closing contacts (e.g. sprinkler flow switch)*
- *Designed to be remotely sited*
- *Powered by built-in 10 year lithium cells*

Ei411H Remote Control Switch

- *Allows alarm Locate, Hush and Test functions to be performed*
- *Completely wire-free*
- *Powered by built-in 10 year lithium cells*
- *For use only with Ei2110 Multi-Sensor and Ei160RC Series alarms on Ei168RC bases*

Ei420 Repeater & CO Alarm Interface

- *Repeats RadioLINK signals to strengthen signal paths*
- *Allows Ei260RC Series Carbon Monoxide (CO) alarms to be linked into a RadioLINK system*
- *Mains powered with 10 year+ rechargeable lithium cell back-up*

Ei428 Remote Relay Module

- *Contains set of relay contacts that are switched on receipt of a RadioLINK signal*
- *Volt-free relay contacts, rated at 240V 5A*
- *Mains powered with 10 year+ rechargeable lithium cell back-up*
- *Pulse or Constant switching option*

Special Needs Systems

Under BS 5839: Part 6: 2004, it is essential to identify any special needs that tenants may have and to adequately address them to ensure they have the correct level of fire protection.

For many years Aico and Ei have specialised – and led the field – in the development and provision of fire safety technology to help responsible landlords protect vulnerable tenants.

features and benefits

- Mains powered control panel with rechargeable battery back-up
- High intensity integral strobe light
- Vibrating pad for placing under a pillow or mattress
- Auxiliary sockets (2 on Ei170RF) for connection of additional optional strobe lights or vibration pads
- Capability for interconnection with up to 12 alarms
- Test button on control panel for testing the system
- Connections are monitored to check integrity of system
- Alarm clock input facility
- Pager output facility
- Compatible with RadioLINK alarms systems (Ei170RF, Ei176RF only)
- Systems available for mains or battery operated smoke alarms

Alarm Systems for the Deaf & Hearing Impaired

People with hearing difficulties require a different approach to fire protection, as a conventional alarm sounder will not be sufficient for their needs. Aico's range of alarms for the deaf and hearing impaired are the only units currently available from an experienced smoke alarm manufacturer. They are also available with RadioLINK to remove the need to run wiring upto the alarm system and so provide quick and easy installation.

Ei428SK

Relay Module to Interface with Warden Call Systems

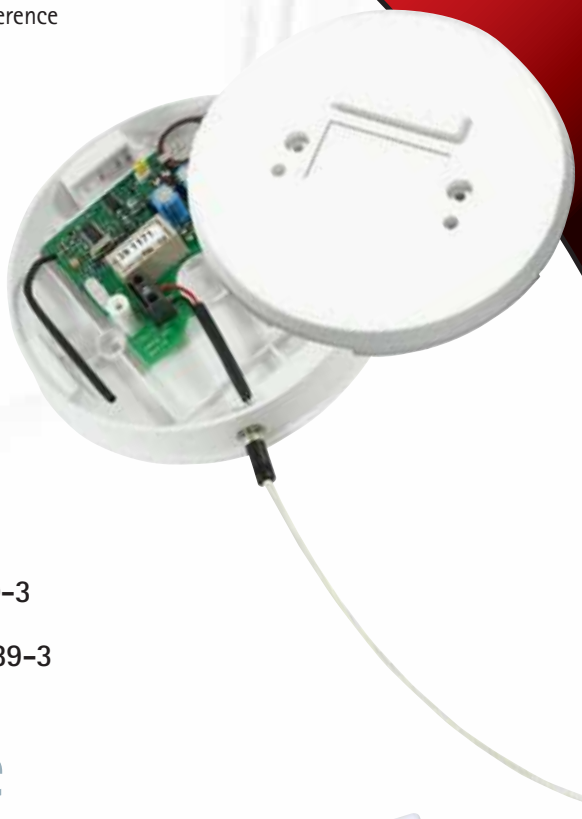
The Ei428SK is a RadioLINK relay module that allows a RadioLINK smoke/heat alarm system to activate a Social Alarm module to transmit an emergency alarm signal to most forms of Warden Call systems.

The Ei428SK is fitted with a pre-wired socket and supplied with a 2m cable to allow an easy hard-wire connection to an input on a Social Alarm module. The module can be sited at any convenient point within a property and is supplied with a cover.

The Ei428SK uses advanced transceiver and signal coding technology to ensure robust and reliable RF signalling. The unique coding system eliminates the possibility of interference from neighbouring systems.

RadioLINK compatible

see pages 14–15



features and benefits

- Remote Relay Module designed for use with RadioLINK bases and accessories
- Socket and 2m cable supplied to allow easy connection to most Social Alarm systems
- Pre-Wired relay contacts are monitored to provide warning in the event of cable disconnection or failure
- Visual RF transmission and power indicator
- Powered by 230VAC mains supply with built-in rechargeable lithium cell back-up in case of mains failure
- Unique House-Coding to eliminate interference from adjacent systems
- Low battery power warning
- RF performance to EN 300220-3
- EMC performance to EN 301489-3

Fire Safety and RC Remote Control

Reaching up to test or hush a ceiling mounted smoke alarm can be a difficult and dangerous practice for even the able bodied. For the infirm or elderly it may prove practically impossible.

When assessing the needs of the elderly or infirm in particular, it is strongly advised to include a Remote Control Switch, enabling test, locate and hush functions to be conducted from a safe and convenient location on a wall.

This switch can also be used as part of any Deaf Alarm system, whether hardwired (Ei1529RC) or RadioLINK (Ei411H - see pages 20-21).

Carbon Monoxide (CO) Alarms

Ei261ENRC Mains Powered CO Alarm with Rechargeable Lithium Cells and Replaceable CO Sensor

Carbon Monoxide (CO), is a particularly insidious gas. It is a killer. The naked eye can't see it, it does not smell, it has no taste. The need for a reliable mains powered alarm that will operate even in the event of a mains failure is obvious.

The Ei professional range includes fully featured product usually specified by Local Authorities and Landlords and less sophisticated product where duty of care is not so much of an issue and where the mains supply is more likely to be continuous and/or regular battery maintenance is known to be reliably carried out.

The Ei261ENRC is the top of the range product. Current sensor technology used by all manufacturers of CO alarms has a limited life cycle; the sensors cannot be relied upon after a period of 5/6 years. The Ei261ENRC offers a replacement sensor feature, thereby increasing the life cycle of the product to ten years.

Ei261DENRC

features and benefits

- Built-in 10 year+ rechargeable lithium cell back-up designed to outlast the alarm
- Replacement sensor module, minimum five year life
- Easy to use test/hush button
- Automatic self diagnostics
- Distinctive alarm sound, easily distinguishable from a smoke alarm
- Wall or ceiling mounting
- Pre alarm warning
- Interconnect feature
- Comprehensive Indicator lights: Mains Power / Alarm / Fault
- Optional digital display – Ei261DENRC
- Quick CO gas test feature
- Kitemarked to BS EN 50291: 2001

Smoke and CO Alarms Interconnected with an Ei1529RC

Ei261ENRC

NOW WITH RC Remote Control Functionality

Ei261ENRC

for Remote Control of the System

Ei1529RC

CARBON MONOXIDE (CO) ALARM SPECIFICATIONS

Product Code	Ei261DENRC	Ei261ENRC	Ei225EN	Ei205ENA
Mains Powered	✔	✔	✔	
Lithium Rechargeable Cells	✔	✔		
Powered by 3 x AA Alkaline Batteries				✔
Electrochemical Cell CO Sensor Element	✔	✔	✔	✔
85dB(A) @ 3m Sound Output	✔	✔	✔	✔
Easi-fit System	✔	✔		
Comprehensive LED Indicators	✔	✔	✔	✔
Digital LCD CO (ppm) Display	✔			
CO Level Memory Feature	✔	✔	✔	✔
Audible Fault Warning	✔	✔	✔	✔
Audible Low Battery Warning	✔	✔		✔
Test/Hush Button	✔	✔	✔	✔
Interconnection Capability	✔	✔		
Replaceable Sensor Module	✔	✔		
Quick CO Gas Test Feature	✔	✔	✔	✔
Pre-Alarm For Low CO Levels	✔	✔	✔	✔
High Level of Gas Type Selectivity	✔	✔	✔	✔
Unit Activation Upon Connection	✔	✔	✔	✔
Soldered Horn Contacts	✔	✔	✔	✔
Tamper Resistant Cover	✔	✔	✔	✔
Tamper-proof Cells	✔	✔		
Locking Screw Hole	✔	✔		
Multiple Cable Entries	✔	✔	✔	
Date Code Identification	✔	✔	✔	✔
BS Kitemarked to BS EN 50291	✔	✔	✔	✔
CE Certified	✔	✔	✔	✔
EMC Conformance	✔	✔	✔	✔
Fixings Included	✔	✔	✔	✔
Typical Footprint Dimensions (mm)	155 x 125	155 x 125	135 x 105	135 x 105

Easy Product Reference Guide

Specifier Range - Ei-fire Multi-Sensor 10-11

Ei2110 Multi-Sensor Optical and Heat Alarm with Hush, Built in 10Yr+Rechargeable Lithium Cells, Mounting Plate and Remote Control Functionality

Specifier Range - 160RC Series 12-13

Ei161RC Ionisation with Hush, Built in 10 Yr+ Rechargeable Lithium Cells, Mounting Plate and Remote Control Functionality
Ei164RC Heat Alarm with Hush, Built in 10 Yr+ Rechargeable Lithium Cells, Mounting Plate and Remote Control Functionality
Ei166RC Optical with Hush, Built in 10 Yr+ Rechargeable Lithium Cells, Mounting Plate and Remote Control Functionality

RadioLINK Wireless Communication 14-15

Ei168RC RadioLINK Multi-Repeater Interconnect Base with 10 Yr+ Rechargeable Lithium Cells for Ei2110 Multi-Sensor, Ei160RC and Ei140 Series Alarms

RadioLINK System Devices

Ei407 Remote Manual Call Point for use with Ei2110 Multi-Sensor, Ei160RC and Ei140 Series Alarms with Ei168RC Bases
Ei408 Switched Input Module
Ei411H Remote Control Switch with Test, Hush and Locate functions for use with Ei2110 Multi-Sensor and Ei160RC Series Alarms with Ei168RC Bases
Ei420 Repeater and CO Alarm Interface
Ei428 Remote Relay Module with 5 Amp Relay and 10 Yr+ Rechargeable Lithium Cells
Ei428SK Remote Relay Module with 10 Yr+ Rechargeable Lithium Cells for use with Warden Call interfaces

Additional products Available from Aico not covered in this guide

Ei405 Optical Smoke Alarm with Alkaline Battery and Wireless (RF) Interconnect
Ei405TY Optical Smoke Alarm with 10 Year Lithium Cells and Wireless (RF) Interconnect
Ei410 Hand Held Remote Control for use with Ei2110 Multi-Sensor and Ei160RC Series Alarms with Ei168RC Bases
MCRSK Remote Manual Call Point Spare Key

Contractor Range - 140 Series 16-17

Ei141 Ionisation with Hush, Alkaline Battery Back-up and Mounting Plate
Ei144 Heat Alarm with Hush, Alkaline Battery Back-up and Mounting Plate
Ei146 Optical with Hush, Alkaline Battery Back-up and Mounting Plate

150 Series 18

Ei151TL Ionisation with Hush and Built in 10 Yr+ Rechargeable Lithium Cells
Ei154TL Heat Alarm with Built in 10 Yr+ Rechargeable Lithium Cells
Ei156TLH Optical with Hush and Built in 10 Yr+ Rechargeable Lithium Cells

Additional products Available from Aico not covered in this guide

Ei151TLR Ionisation with Hush and Built in 10 Yr+ Rechargeable Lithium Cells for use with Ei152 Switch
Ei156TLR Optical with Hush and Built in 10 Yr+ Rechargeable Lithium Cells for use with Ei152 Switch
Ei157 Surface Mount Kit for 150 Series
Ei157R Surface Mount Kit with 6 way terminal block for 150 Series
Ei158R Surface Mount Kit with 5 Amp Relay and Switchable Pulse Feature for 150 Series

Security & Social Alarm Systems - Low Voltage Alarms 19

Ei100R 12V Ionisation Smoke Alarm with Interconnect and Relay Contacts
Ei103R 12V Heat Alarm with Interconnect and Relay Contacts
Ei105R 12V Optical Smoke Alarm with Interconnect and Relay Contacts
Ei181 10-30V Ionisation Smoke Alarm with Battery Back-up, Interconnect and Relay Contacts
Ei184 10-30V Heat Alarm with Battery Back-up, Interconnect and Relay Contacts
Ei186 10-30V Optical Smoke Alarm with Battery Back-up, Interconnect and Relay Contacts

Battery Alarms 19

Ei100TYC Ionisation Smoke Alarm with 10 Year Lithium Cells, Interconnect and Hush
Ei3105TYCH Optical Smoke Alarm with 10 Year Lithium Cells, Interconnect and Hush

Additional products Available from Aico not covered in this guide

Ei100BNX Ionisation Smoke Alarm
Ei100PFNP18 Ionisation Smoke Alarm, LED with Alkaline Battery
Ei100C Ionisation Smoke Alarm with Alkaline Battery and Interconnect
Ei100L Ionisation Smoke Alarm with Alkaline Battery and Escape Light

Battery Alarms (continued) 19

Ei100S	Ionisation Smoke Alarm with Alkaline Battery and Hush
Ei103C	Heat Alarm with Alkaline Battery and Interconnect
Ei105C	Optical Smoke Alarm with Interconnect
Ei105CP18	Optical Smoke Alarm with Alkaline Battery and Interconnect

Surface Mount Kits & Relays For 2110, 160RC and 140 Series 20

Ei128R	Surface Mount Kit with 5 Amp Relay with Switchable Pulse Feature for Ei140 Series
Ei128RBU	Surface Mount Kit as Ei128R with 10 Yr+Rechargeable Lithium Cells for Ei2110 Multi-Sensor, Ei160RC and Ei140 Series
Ei128COV	Cover Plate for the Ei128R and Ei128RBU, also allows use with Ei260RC Series CO Alarms

Additional products Available from Aico not covered in this guide

Ei127	Surface Mount Kit for Ei2110 Multi-Sensor, Ei160RC and Ei140 Series

Hard Wired System Devices 20-21

Ei159	Alarm Locator Switch for use with Ei2110 Multi-Sensor, Ei160RC, Ei150, Ei140 and Ei260RC Series Alarms
Ei1529RC	Alarm Remote Test, Hush and Locate Switch for use with Ei2110 Multi-Sensor, Ei160RC and Ei260RC Series Alarms
MCP401RC	Manual Call Point Surface Mount for use with Ei2110 Multi-Sensor, Ei160RC, Ei150 and Ei140 Series Alarms

Ancillaries 20-21

Ei167RC	230V Mains Remote Sounder with Built in 10Yr+ Rechargeable Lithium Cells for use with Ei160RC Models
YO3	230V Mains Multi Frequency Sounder
MDH230	230V Magnetic Door Release
MDH24	24V Magnetic Door Release
SAB300C	230V Xenon Beacon with Clear Lens
SAB300R	230V Xenon Beacon with Red Lens
SABV4OL	230V 5 Joule Xenon Beacon Opal Lens
SABV4RL	230V 5 Joule Xenon Beacon Red Lens

Additional products Available from Aico not covered in this guide

COC300	Canister of CO Gas for use with SAT332
Ei115	Anti Vandal Cage - fits Ei2110 Multi-Sensor, Ei160RC, Ei150 and Ei140 Series Alarms
Ei152	Switch for Ei150 'R' models
Ei520	Ei Fire Blanket 1.1 x 1.1 metre square
Ei533	Ei Dry Powder Extinguisher 950g
SAA300	Smoke Aerosol Canister 250ml for use with SAT332
SAT332	Dispenser for SAA300 and COC300 Canisters
SATP101	Extension Pole 1.13m for SAT332

Special Needs Systems 22-23

Ei170RF	RadioLINK Mains Deaf Alarm Strobe and Vibrating Pad
Ei176RF	RadioLINK Deaf Alarm Strobe and Vibrating Pad complete with RadioLINK Optical Smoke Alarm

Additional products Available from Aico not covered in this guide

Ei169	Mains Deaf Alarm Strobe and Vibrating Pad for Ei150 Series Alarms
Ei169/160	Mains Deaf Alarm Strobe and Vibrating Pad for Ei2110 Multi-Sensor and Ei160RC Series Alarms
Ei174	Additional Vibrating Pad
Ei175	Deaf Alarm Strobe and Vibrating Pad complete with 9V Ionisation Smoke Alarm
Ei176	Deaf Alarm Strobe and Vibrating Pad complete with 9V Optical Smoke Alarm
Ei178	Additional Strobe

Carbon Monoxide Alarms 24-25

Ei205ENA	Battery only CO Alarm with Memory Feature
Ei225EN	Mains only CO Alarm with Built in Pattress and Memory Feature
Ei261ENRC	Mains CO Alarm with 10 Yr+ Rechargeable Lithium Cell Back-up, Replaceable Sensor and Remote Control Functionality
Ei261DENRC	Mains CO Alarm with 10 Yr+ Rechargeable Lithium Cell Back-up, Digital Display, Replaceable Sensor and Remote Control Functionality

Additional products Available from Aico not covered in this guide

Ei201	CO Spot Detector 12 months life cycle
Ei220EN	Mains Only CO Alarm with 2.5m Lead and 13 Amp Plug
Ei261M	Replacement CO Sensor for Ei261 and Ei261D
Ei261MEN	Replacement CO Sensor for Ei261ENRC, Ei261EN, Ei261DENRC and Ei261DEN
GSV415SA	Solenoid Gas Shut Off Valve for use with Ei128RBU Relay with Ei128COV Cover connected to an Ei260RC Series CO Alarm

Product Guide

NEW

Multi-Sensor Alarm Ei2110

- More Comprehensive Detection Capability
- Simplified Alarm Choice
- Reduced False Alarms
- Unique 'Dust Compensation'
- 10 Year Plus Lithium Back up Technology
- Hard-Wired or RadioLINK Interconnection
- Easi-Fit Design – Save Time and Money
- Full Remote Control Functionality

Download all product information from **www.aico.co.uk**

Stockist

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